



[4910-13-P]

**DEPARTMENT OF TRANSPORTATION**

**Federal Aviation Administration**

**14 CFR Part 39**

**[Docket No. FAA-2018-0496; Product Identifier 2018-NM-031-AD; Amendment 39-19414; AD 2018-19-14]**

**RIN 2120-AA64**

**Airworthiness Directives; Dassault Aviation Airplanes**

**AGENCY:** Federal Aviation Administration (FAA), DOT.

**ACTION:** Final rule.

**SUMMARY:** We are adopting a new airworthiness directive (AD) for certain Dassault Aviation Model FALCON 2000 and FALCON 2000EX airplanes. This AD was prompted by reports of metallic debris found in the wing slat piccolo tubes; investigation revealed that the debris originated from the flow guide of the ball joint of the wing anti-ice valve. This AD requires repetitive inspections for metallic debris and damage of the flow guide of the ball joint of the wing anti-ice valve, and related investigative and corrective actions if necessary. We are issuing this AD to address the unsafe condition on these products.

**DATES:** This AD is effective [INSERT DATE 35 DAYS AFTER DATE OF PUBLICATION IN THE FEDERAL REGISTER].

The Director of the Federal Register approved the incorporation by reference of certain publications listed in this AD as of [INSERT DATE 35 DAYS AFTER DATE OF PUBLICATION IN THE FEDERAL REGISTER].

**ADDRESSES:** For service information identified in this final rule, contact Dassault Falcon Jet Corporation, Teterboro Airport, P.O. Box 2000, South Hackensack, NJ 07606; telephone 201-440-6700; Internet <http://www.dassaultfalcon.com>. You may view this service information at the FAA, Transport Standards Branch, 2200 South 216th St., Des Moines, WA. For information on the availability of this material at the FAA, call 206-231-3195. It is also available on the Internet at <http://www.regulations.gov> by searching for and locating Docket No. FAA-2018-0496.

### **Examining the AD Docket**

You may examine the AD docket on the Internet at <http://www.regulations.gov> by searching for and locating Docket No. FAA-2018-0496; or in person at Docket Operations between 9 a.m. and 5 p.m., Monday through Friday, except Federal holidays. The AD docket contains this final rule, the regulatory evaluation, any comments received, and other information. The address for Docket Operations (phone: 800-647-5527) is U.S. Department of Transportation, Docket Operations, M-30, West Building Ground Floor, Room W12-140, 1200 New Jersey Avenue SE., Washington, DC 20590.

**FOR FURTHER INFORMATION CONTACT:** Tom Rodriguez, Aerospace Engineer, International Section, Transport Standards Branch, FAA, 2200 South 216th Street, Des Moines, WA 98198; telephone and fax 206-231-3226.

### **SUPPLEMENTARY INFORMATION:**

#### **Discussion**

We issued a notice of proposed rulemaking (NPRM) to amend 14 CFR part 39 by adding an AD that would apply to certain Dassault Aviation Model FALCON 2000 and

FALCON 2000EX airplanes. The NPRM published in the Federal Register on June 1, 2018 (83 FR 25417). The NPRM was prompted by reports of metallic debris found in the wing slat piccolo tubes; investigation revealed that the debris originated from the flow guide of the ball joint of the wing anti-ice valve. The NPRM proposed to require repetitive inspections for metallic debris and damage of the flow guide of the ball joint of the wing anti-ice valve, and related investigative and corrective actions if necessary.

We are issuing this AD to address restricted airflow of the piccolo tubes, leading to insufficient wing anti-ice capability and significant undetected ice accretion on the wing, which could result in loss of control of the airplane.

The European Aviation Safety Agency (EASA), which is the Technical Agent for the Member States of the European Union, has issued EASA Airworthiness Directive 2018-0022, dated January 29, 2018 (referred to after this as the Mandatory Continuing Airworthiness Information, or “the MCAI”), to correct an unsafe condition for certain Dassault Aviation Model FALCON 2000 and FALCON 2000EX airplanes. The MCAI states:

Occurrences were reported on Falcon 2000 and Falcon 2000EX aeroplanes, where metallic debris was found in slat piccolo tubes. The technical investigation revealed that debris originated from the flow guide of the ball joint located downstream of the wing anti-ice valve. It was also determined that small debris gathers at the end of the piccolo tube, but larger pieces of debris may stop before, in the distribution piping, restricting the airflow and potentially leading to undetected insufficient wing anti-ice capability.

This condition, if not detected and corrected, could lead to undetected significant ice accretion on the wing, possibly resulting in loss of control of the aeroplane.

To address this potential unsafe condition, Dassault Aviation issued Service Bulletin (SB) F2000EX-413 for

Falcon 2000EX and SB F2000-441 for Falcon 2000, providing applicable instructions.

For the reasons described above, this [EASA] AD requires repetitive [detailed] inspections [for discrepancies including cracks and loss of material] of the affected ball joint and, depending on findings, accomplishment of applicable [related investigative and] corrective actions  
\* \* \*.

You may examine the MCAI in the AD docket on the Internet at <http://www.regulations.gov> by searching for and locating Docket No. FAA-2018-0496.

### **Comments**

We gave the public the opportunity to participate in developing this final rule. We received no comments on the NPRM or on the determination of the cost to the public.

### **Conclusion**

We reviewed the relevant data and determined that air safety and the public interest require adopting this final rule as proposed, except for minor editorial changes.

We have determined that these minor changes:

- Are consistent with the intent that was proposed in the NPRM for addressing the unsafe condition; and
- Do not add any additional burden upon the public than was already proposed in the NPRM.

### **Related Service Information under 1 CFR part 51**

Dassault Aviation has issued Service Bulletins F2000-441, dated June 20, 2017; and F2000EX-413, dated July 10, 2017. This service information describes procedures for repetitive inspections for metallic debris and damage of the flow guide of the ball joint located downstream of the wing anti-ice valve. This service information also describes procedures for replacing the ball joint and pipe, and performing borescope

inspections of damaged wing anti-ice pipes and removal of any debris from the flow guide. These documents are distinct since they apply to different airplane models. This service information is reasonably available because the interested parties have access to it through their normal course of business or by the means identified in the ADDRESSES section.

### **Costs of Compliance**

We estimate that this AD affects 348 airplanes of U.S. registry. We estimate the following costs to comply with this AD:

#### **Estimated costs for required actions**

<b>Labor cost</b>	<b>Parts cost</b>	<b>Cost per product</b>	<b>Cost on U.S. operators</b>
6 work-hours X \$85 per hour = \$510	\$0	\$510	\$177,480

We have received no definitive data that enables us to provide cost estimates for the on-condition actions specified in this AD.

### **Authority for this Rulemaking**

Title 49 of the United States Code specifies the FAA's authority to issue rules on aviation safety. Subtitle I, section 106, describes the authority of the FAA Administrator. Subtitle VII: Aviation Programs, describes in more detail the scope of the Agency's authority.

We are issuing this rulemaking under the authority described in Subtitle VII, Part A, Subpart III, Section 44701: "General requirements." Under that section, Congress charges the FAA with promoting safe flight of civil aircraft in air commerce by prescribing regulations for practices, methods, and procedures the Administrator finds necessary for safety in air commerce. This regulation is within the scope of that authority

because it addresses an unsafe condition that is likely to exist or develop on products identified in this rulemaking action.

This AD is issued in accordance with authority delegated by the Executive Director, Aircraft Certification Service, as authorized by FAA Order 8000.51C. In accordance with that order, issuance of ADs is normally a function of the Compliance and Airworthiness Division, but during this transition period, the Executive Director has delegated the authority to issue ADs applicable to transport category airplanes and associated appliances to the Director of the System Oversight Division.

### **Regulatory Findings**

This AD will not have federalism implications under Executive Order 13132. This AD will not have a substantial direct effect on the States, on the relationship between the national government and the States, or on the distribution of power and responsibilities among the various levels of government.

For the reasons discussed above, I certify that this AD:

- (1) Is not a “significant regulatory action” under Executive Order 12866,
- (2) Is not a “significant rule” under the DOT Regulatory Policies and Procedures (44 FR 11034, February 26, 1979),
- (3) Will not affect intrastate aviation in Alaska, and
- (4) Will not have a significant economic impact, positive or negative, on a substantial number of small entities under the criteria of the Regulatory Flexibility Act.

### **List of Subjects in 14 CFR Part 39**

Air transportation, Aircraft, Aviation safety, Incorporation by reference, Safety.

## **Adoption of the Amendment**

Accordingly, under the authority delegated to me by the Administrator, the FAA amends 14 CFR part 39 as follows:

### **PART 39 - AIRWORTHINESS DIRECTIVES**

1. The authority citation for part 39 continues to read as follows:

Authority: 49 U.S.C. 106(g), 40113, 44701.

#### **§ 39.13 [Amended]**

2. The FAA amends § 39.13 by adding the following new airworthiness directive (AD):

**2018-19-14 Dassault Aviation:** Amendment 39-19414; Docket No. FAA-2018-0496; Product Identifier 2018-NM-031-AD.

#### **(a) Effective Date**

This AD is effective [INSERT DATE 35 DAYS AFTER DATE OF PUBLICATION IN THE FEDERAL REGISTER].

#### **(b) Affected ADs**

None.

#### **(c) Applicability**

This AD applies to Dassault Aviation Model FALCON 2000 and FALCON 2000EX airplanes, certificated in any category, all serial numbers equipped with any anti-ice pipe having part number (P/N) F2MA724561A1 or P/N F2MA724561A2, except airplanes on which Dassault Modification (mod) M5000 or Dassault mod M5001 has been embodied in production.

**(d) Subject**

Air Transport Association (ATA) of America Code 30, Ice and Rain Protection.

**(e) Reason**

This AD was prompted by reports of metallic debris found in the wing slat piccolo tubes; investigation revealed that the debris originated from the flow guide of the ball joint located downstream of the wing anti-ice valve. We are issuing this AD to address restricted airflow of the piccolo tubes, leading to insufficient wing anti-ice capability and significant undetected ice accretion on the wing, which could result in loss of control of the airplane.

**(f) Compliance**

Comply with this AD within the compliance times specified, unless already done.

**(g) Repetitive Inspections and Corrective Actions**

Within 25 months after the effective date of this AD: Perform a detailed inspection for discrepancies of the flow guide of the ball joint located downstream of the wing anti-ice valve, and do all applicable related investigative and corrective actions, in accordance with the Accomplishment Instructions of Dassault Aviation Service Bulletin F2000-441, dated June 20, 2017; or Dassault Aviation Service Bulletin F2000EX-413, dated July 10, 2017; as applicable. Repeat the detailed inspection thereafter at intervals not to exceed 25 months. Do all applicable corrective actions before further flight.

**(h) No Reporting Requirement**

Although the service information identified in paragraph (g) of this AD specifies to submit certain information to the manufacturer, this AD does not include that requirement.



**(i) Other FAA AD Provisions**

The following provisions also apply to this AD:

(1) *Alternative Methods of Compliance (AMOCs)*: The Manager, International Section, Transport Standards Branch, FAA, has the authority to approve AMOCs for this AD, if requested using the procedures found in 14 CFR 39.19. In accordance with 14 CFR 39.19, send your request to your principal inspector or local Flight Standards District Office, as appropriate. If sending information directly to the International Section, send it to the attention of the person identified in paragraph (j)(2) of this AD. Information may be emailed to: 9-ANM-116-AMOC-REQUESTS@faa.gov. Before using any approved AMOC, notify your appropriate principal inspector, or lacking a principal inspector, the manager of the local flight standards district office/certificate holding district office.

(2) *Contacting the Manufacturer*: For any requirement in this AD to obtain corrective actions from a manufacturer, the action must be accomplished using a method approved by the Manager, International Section, Transport Standards Branch, FAA; or the European Aviation Safety Agency (EASA); or Dassault Aviation's EASA Design Organization Approval (DOA). If approved by the DOA, the approval must include the DOA-authorized signature.

**(j) Related Information**

(1) Refer to Mandatory Continuing Airworthiness Information (MCAI) EASA AD 2018-0022, dated January 29, 2018, for related information. This MCAI may be found in the AD docket on the Internet at <http://www.regulations.gov> by searching for and locating Docket No. FAA-2018-0496.

(2) For more information about this AD, contact Tom Rodriguez, Aerospace Engineer, International Section, Transport Standards Branch, FAA, 2200 South 216th Street, Des Moines, WA 98198; telephone and fax 206-231-3226.

**(k) Material Incorporated by Reference**

(1) The Director of the Federal Register approved the incorporation by reference (IBR) of the service information listed in this paragraph under 5 U.S.C. 552(a) and 1 CFR part 51.

(2) You must use this service information as applicable to do the actions required by this AD, unless this AD specifies otherwise.

(i) Dassault Aviation Service Bulletin F2000-441, dated June 20, 2017.

(ii) Dassault Aviation Service Bulletin F2000EX-413, dated July 10, 2017.

(3) For service information identified in this AD, contact Dassault Falcon Jet Corporation, Teterboro Airport, P.O. Box 2000, South Hackensack, NJ 07606; telephone 201-440-6700; Internet <http://www.dassaultfalcon.com>.

(4) You may view this service information at the FAA, Transport Standards Branch, 2200 South 216th St., Des Moines, WA. For information on the availability of this material at the FAA, call 206-231-3195.

(5) You may view this service information that is incorporated by reference at the National Archives and Records Administration (NARA). For information on the availability of this material at NARA, call 202-741-6030, or go to:

<http://www.archives.gov/federal-register/cfr/ibr-locations.html>.

Issued in Des Moines, Washington, on September 7, 2018.

Michael Kaszycki,  
Acting Director,  
System Oversight Division,  
Aircraft Certification Service.

[FR Doc. 2018-20630 Filed: 9/26/2018 8:45 am; Publication Date: 9/27/2018]